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APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
10/792,225	03/02/2004	Chou Hsuan Tsai	2011153	4775

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PRO-TECHTOR INTERNATIONAL SERVICES  
20775 Norada Court  
Saratoga, CA 95070-3018

EXAMINER
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NGUYEN, KHIEM M

ART UNIT	PAPER NUMBER
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2839

DATE MAILED: 05/02/2005

Please find below and/or attached an Office communication concerning this application or proceeding.

# Office Action Summary

Application No.

10/792,225

Applicant(s)

TSAI, CHOU

Examiner

Khiem Nguyen

Art Unit

2839

-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --

## Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If the period for reply specified above is less than thirty (30) days, a reply within the statutory minimum of thirty (30) days will be considered timely.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

## Status

- 1) ☐ Responsive to communication(s) filed on \_\_\_\_.
- 2a) ☐ This action is **FINAL**. 2b) ☒ This action is non-final.
- 3) ☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

## Disposition of Claims

- 4) ☒ Claim(s) 1-8 is/are pending in the application.
- 4a) Of the above claim(s) \_\_\_\_ is/are withdrawn from consideration.
- 5) ☐ Claim(s) \_\_\_\_ is/are allowed.
- 6) ☒ Claim(s) 1-8 is/are rejected.
- 7) ☐ Claim(s) \_\_\_\_ is/are objected to.
- 8) ☐ Claim(s) \_\_\_\_ are subject to restriction and/or election requirement.

## Application Papers

- 9) ☐ The specification is objected to by the Examiner.
- 10) ☐ The drawing(s) filed on \_\_\_\_ is/are: a) ☐ accepted or b) ☐ objected to by the Examiner.  
Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).  
Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).
- 11) ☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

## Priority under 35 U.S.C. § 119

- 12) ☐ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
- a) ☐ All b) ☐ Some \* c) ☐ None of:
- ☐ Certified copies of the priority documents have been received.
  - ☐ Certified copies of the priority documents have been received in Application No. \_\_\_\_.
  - ☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).

\* See the attached detailed Office action for a list of the certified copies not received.

## Attachment(s)

- |   |   |
|---|---|
| 1) <input checked="" type="checkbox"/> Notice of References Cited (PTO-892)             | 4) <input type="checkbox"/> Interview Summary (PTO-413)                     |
| 2) <input type="checkbox"/> Notice of Draftsperson's Patent Drawing Review (PTO-948)    | Paper No(s)/Mail Date. ____   |
| 3) <input type="checkbox"/> Information Disclosure Statement(s) (PTO-1449 or PTO/SB/08) | 5) <input type="checkbox"/> Notice of Informal Patent Application (PTO-152) |
| Paper No(s)/Mail Date ____  | 6) <input type="checkbox"/> Other: ____                                     |

## DETAILED ACTION

### *Claim Rejections - 35 USC § 102*

1. The following is a quotation of the appropriate paragraphs of 35 U.S.C. 102 that form the basis for the rejections under this section made in this Office action:

A person shall be entitled to a patent unless –

(b) the invention was patented or described in a printed publication in this or a foreign country or in public use or on sale in this country, more than one year prior to the date of application for patent in the United States.

2. Claims 1, and 7-8 are rejected under 35 U.S.C. 102(b) as being clearly anticipated Black et al. (5,009,618).

Black et al. (see figures 23 –24) discloses a terminal structure (114) of an electrical connector, the terminal structure having continuous terminals (116) and a connection material tape (117) connected to the continuous terminals, which are formed by pressing a metal plate, each of the terminals comprising: an extension (115) having a first end and a second end; a connection (118) connected to the first end of the extension; and a contact (91) connected to the second end of the extension, wherein the contact has two elastic arms with a gap there between, and the two elastic arms have contact surfaces close to each other, wherein the extension is horizontal and has a twisted portion (119) to make the contact vertical so that the two contact surfaces of the contact may contact an inserted male terminal in vertical directions.

The twisted portion 119 is also shown formed at the first end of the extension, and the connection has one end connected to the material tape.

***Claim Rejections - 35 USC § 103***

3. The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

(a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negated by the manner in which the invention was made.

4. Claims 1-4, 6-8 are rejected under 35 U.S.C. 103(a) as being unpatentable over Admitted Prior Art (APA) in view of Black et al.

The APA as shown in figures 1-5 of the drawings and discussed in the background of the present application, disclose the terminal structure of an electrical connector except a connection material tape connected to the continuous terminals and each extension has a twisted portion.

Black et al. as discussed above discloses a terminal structure having continuous terminals (116) and a connection material tape (117) connected to the continuous terminals and wherein each extension has a twisted portion (119).

Therefore, it would have been obvious for one of ordinary skill in the art to provide discloses a terminal structure having continuous terminals and a connection material tape connected to the continuous terminals and wherein each extension has a twisted portion for the APA terminal structure in view of the teachings of Black et al. so that the two contact surfaces of the contact may contact an inserted male terminal in vertical directions.

Regarding claims 2 and 4, the APA terminal structure also includes contact surfaces 15 of the contact have a flange 25 protruding over the metal plate. Note

also that the process of extruding a portion of the metal plate to make said flange, as being recited in claim 4 is not given patentable weight in an article claim.

Regarding claim 3, figure 5 of the APA shows the extension 21 has a horizontal plate-surface reducing portion shrunk toward the second end.

Regarding claims 6-7, it would also have been an obvious location of parts to provide the twist portions on either the first or second end of the extension.

5. Claim 5 is rejected under 35 U.S.C. 103(a) as being unpatentable the references as applied to claim 1 above, and further in view of Winger (3,910,663).

The APA in view of Black et al. discloses the claimed terminal structure of an electrical connector as being recited above except the extension has a projection projecting over a plate surface thereof.

Winger discloses a terminal structure 10 for an electrical connector wherein the extension 12 has projection 14 projecting over a plate surface thereof.

Therefore, it would have been obvious to provide a projection projecting over a plate surface thereof for the APA terminal structure. A projection projecting over a plate surface would provide for a stiffer extension of the terminal structure.

### ***Conclusion***


6. The prior art made of record and not relied upon is considered pertinent to applicant's disclosure. Stillabower et al. (6,790,102) is further cited to show a twisted flat terminal structure.

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Any inquiry concerning this communication or earlier communications from the examiner should be directed to Khiem Nguyen whose telephone number is 571 272-2096. The examiner can normally be reached on Mon-Fri.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, TC Patel can be reached on 571 272-2098. The fax phone number for the organization where this application or proceeding is assigned is 703-872-9306.

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see <http://pair-direct.uspto.gov>. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free).

  
Khiem Nguyen  
Primary Examiner  
Art Unit 2839